AMENDMENTS TO THE CLAIMS

Claims 1-28 (canceled).

29. (new): A method of removing a portion of a surface, the method comprising

providing a beam of laser light;

irradiating a location of the surface with the laser light;

wherein a mask means is used to remove a low power density part of the laser beam that is below a threshold power density for surface removal before the surface location is irradiated.

30. (new): A method of removing a portion of a surface according to claim 29 wherein the mask means is a shadow mask.

31. (new): A method of removing a portion of a surface according to claim 30 wherein the shadow mask adsorbs substantially all of that portion of the laser beam that is below the threshold power density.

32. (new): A method of removing a portion of a surface according to claim 29 wherein the mask means is a reflective mask wherein light incident on the mask is reflected by the mask.

33. (new): A method of removing a portion of a surface according to claim 32 wherein the reflection redirects low power density laser light to another low power density portion of the laser beam to create an additional high power density portion of the laser beam.

34. (new): A method of removing a portion of a surface according to claim 29 wherein the surface is a concrete surface contaminated with radionuclides.

35. (new): A method removing a portion of a surface according to claim 29 wherein the surface portion is removed by the effects of thermal shock.

36. (new): An apparatus for removing a portion of a surface by irradiation with laser light, the apparatus comprising

a laser source for producing a laser beam for irradiating a location on the surface; and

a mask means to remove a lower power density part of the laser beam.

37. (new): An apparatus according to claim 36 wherein the mask means is a shadow mask that adsorbs 'low intensity' radiation.

38. (new): An apparatus according to claim 36 wherein the mask means is a reflective mask that redirects at least a part of the 'low intensity' portion of the radiation.

39. (new): An apparatus according to claim 36 wherein the mask means is provided with an aperture and wherein a high power density part of a laser beam passes through the aperture.

40. (new): An apparatus according to claim 36 wherein the mask means is tubular.

41. (new): An apparatus according to claim 36 wherein the mask means comprises a metal or a ceramic.

42. (new): An apparatus according to claim 36 wherein the mask means is coated.

43. (new): An apparatus according to claim 42 wherein the coating is a light-adsorbing coating.

44. (new): An apparatus according to claim 42 wherein the coating is a reflective coating.

45. (new): An apparatus according to claim 36 wherein the laser source is an Yttrium Aluminum Garnet (YAG) laser.